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MILLET (*Chaetochloa italica*).

The foxtail millets included in this group are the ones most commonly used as forage. They are known and grown throughout the United States mostly as catch crops. As a crop they are extremely adaptable both as to climate and soil. The quality of hay produced is rather inferior, especially if allowed to become too ripe before it is cut. No danger is experienced in feeding it to either cattle or sheep, but instances of unfavorable results when fed to horses are numerous. The hay is slightly laxative and also acts as a diuretic, its effects on the kidneys being particularly noticeable in horses. Hay intended for feeding horses should be cut before the seed has formed; such hay is more palatable and is not dangerous.

Millets can not be classed among drought-resistant plants, although they are much grown in the semiarid regions. Their ability to make a crop under such conditions is due to their short season of growth, which often allows them to evade dry spells.

Millet is said to be "hard on the soil," and the following crop, especially if it is a small grain, will in most cases be less than where grown following corn or one of the small grains. This effect arises largely from the fact that millet has an intensive root system and feeds very heavily on the upper 6 or 8 inches of soil, leaving the surface supply of available plant food and moisture greatly depleted.

Recommendations in regard to seeding, harvesting, and feeding apply to the whole group of varieties.

VARIETIES OF FOXTAIL MILLETS.

Among the more prominent foxtail millets are the following cultivated varieties:

Common or Dakota.—This is the best known and perhaps the most widely grown of the foxtail group of millets. This variety is fine-stemmed and leafy, with a close, compact seed head, in which are inclosed numerous yellow seeds which are flattened on one surface. It is characterized by a short season of growth and produces a fair yield of hay of good quality.

Goldmine.—This is one of the more productive strains of common millet. It was obtained from the Ontario Experiment Station, Guelph, Ontario, Canada, under the name of Holy Terror Goldmine. It has consistently outyielded the ordinary common millet in the semiarid region.

German.—This variety is coarser than the common, with broad leaves and a distinctly lobed seed head, much larger and somewhat more loose than the common. The individual seeds are yellow, like the common, but smaller and more globular. The season of growth is fully two weeks longer than the common. The hay yield is larger, but the quality not quite so good.

The Golden Wonder is a selected type of the German in which the head is distinctly lobed but more compact, longer, and of less diameter than the ordinary German. It makes good yields of both forage and seed.

Hungarian.—This variety possesses a small, compact seed head, with seeds much the same shape as those of common millet. The color of the seeds varies from yellow to black or very dark purple, both colors being found in one head. The season of maturity is intermediate between the common and German, but the yield is practically the same as the common, except under dry climatic conditions, when it is likely to be less. It is better suited to the humid climates of the East. The quality of hay is first class.

Siberian.—This variety, which was introduced from Russia, in vegetative characters is very similar to the common, except that it has orange-colored seed. The season of growth is a few days longer than the common and the yield slightly larger, especially in the semiarid districts. This is a hardy, drought-resistant form, suited to the Dakotas, Montana, Wyoming, Colorado, western Nebraska, and western Kansas.

Kursk.—This is a selected strain of the Siberian millet, which was introduced by the United States Department of Agriculture and has been bred in South Dakota for drought resistance, hardiness, and uniformity. It was given the name Kursk from the province in Russia where it was obtained. It is a dependable millet for the dry regions and is especially adapted to the same States as the Siberian.

SEEDING AND HARVESTING.

Seeding.—The short season of growth permits considerable latitude in respect to the time of seeding. Millet should not be sown, however, until the ground is warm. This means ordinarily about two or three weeks after corn-planting time, which in the Central States would place the earliest planting about the last day of May. It can be sown any time between this date and August 1, or at least as late as it can be sown and mature before frost, allowing from 60 to 90 days.

The seed bed for millet should be prepared by plowing and repeated harrowing. It can be seeded on cornstalk ground, but the best results are obtained by seeding on spring plowing, especially if care is used to level and compact the seed bed.

Millet can be sown broadcast and harrowed in or planted with a grain drill. When good seed is used 20 to 25 pounds per acre are sufficient, and in the drier sections this can be reduced to 12 or 15 pounds.

Where the season is long it is often possible to secure a crop of millet after another crop, such as oats, barley, or wheat, has been removed. In such cases the ground may be prepared for seeding by disking. This, however, is not a good practice, since it is hard on the land, both crops being surface feeders to a great extent.

One feature which should be borne in mind is to have the ground level after seeding, so that clods and other unevenness will not interfere with the mower. This result may be accomplished by rolling the field after it is seeded. Where the rainfall is slight or where there is danger from blowing, a harrow should follow the roller to prevent the surface from baking or blowing.

Harvesting.—The foxtail millets cure easily and are handled in the same way as any other hay crop. If the hay is designed for general use, i. e., feeding both cattle and horses, it should be cut just after blooming; if it is intended for cattle or sheep exclusively, it may become somewhat more mature and can be cut when the seed is in the late milk stage. Where a seed crop is the object, the crop is best harvested with a grain binder, placed in shocks like bundle grain, and thrashed in the same way. In some sections where millet is being grown for seed the farmers plant it in rows sufficiently far apart to cultivate. This practice gives an especially good quality of seed, but, of course, entails more labor.

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